

## CHAPTER II

### LITERATURE REVIEW

#### 2.1 Comic Ecosystem in Indonesia

As the case study of this research, Indonesia local comics were famously known for the variety of genres, starting from fantasy, heroic action, folklore, comedy, and slice of life stories. The local comic brings out Indonesia's traditional values, along with the structure of the stories, that many of the audience find simple and easy to understand (Santoso, 2024). Although Indonesia's local comics were most likely to receive influences from Japanese's Manga visual style, the local comics were still able to adapt into Indonesia's local culture. According to Kurniawan (2017), the development of national culture in Indonesian local comics, mainly superhero comics, was strongly shaped by the social, cultural, political, and economic conditions of the period. Tracing back on the history of Indonesian comics, the industry had struggled to survive, due to the weak management of the local comic during the most prominent period of Indonesian comics from the 1950s to the 1970s. There are many local superhero comics, such as Sri Asih by R.A. Kosasih, Panji Tengkorak by Hans Jaladara, Gundala Putra Petir by Hasmi, and many more, have achieved strong commercial success. And yet, the local publishers' management has made it vulnerable when Japanese comics entered the worldwide market in the early 1990s, as indicated in an interview with Edwin Te, published by *Grafis Masa Kini* in 2025. Although Indonesian comics have experienced a renewed modern momentum in the 1990s, the comic industry in Indonesia is not as stable and visible as the comic industry in Japan or America.

Indonesia has 17 growing sub-sectors of the creative economy in the industry (EKRAF, 2022). Thus, the comic sub-sector was not one of the creative economy sub-sectors. Instead, comic was a part of the publishing sub-sectors in Indonesia's creative industry. Although comics in Indonesia were categorized in the publishing sub-sectors, in reality, comics intersect closely with digital media. Many of the media was in forms of comic digital platforms, such as Webtoon and

Karya Karsa, or comics that were posted on social media, such as Instagram, Twitter, and many more. Even though the comic industry already has many stakeholders that partake in the collaboration to create a strong comic culture and industry in Indonesia, the comic sub-sector still faces different challenges than the other sub-sector in the publishing creative industry. Recently, Indonesia's comic sector has experienced the absence of such structured ecosystem analysis that is able to contribute to sectoral invisibility, as illustrated by Hutapea (2025) that Indonesia's comic sector was seen as an almost "non-existent" ecosystem.

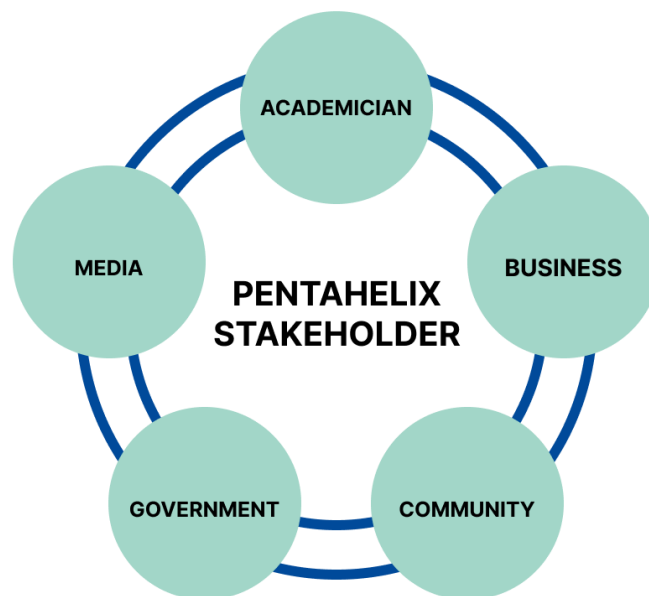


Figure 2.1 Pentahelix Stakeholder  
Source: EKRAF (2022)

According to EKRAF in the *Creative Economy and Innovation Committee* (2022), the Indonesian government identifies five actors or stakeholders within the creative industry under the "Pentahelix Stakeholder" model: academia, business, community, government, and media. The stakeholders in the comic ecosystem involved with comic associations, comic publishers and editors, comic magazines artist and illustrator, local physic and digital comic series, comic events and market, animated and live action films based on comics, and many more

(Frederick et al., 2023). This shows that the main urgency is not about the missing actors or elements in the comic ecosystem, but rather from the weak interaction, limited coordination, and the lack of a shared collective vision within the Indonesian Comic Ecosystem stakeholder.

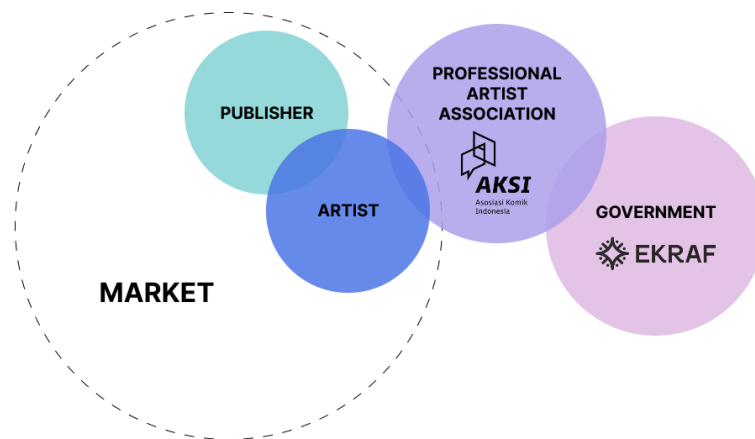


Figure 2.2 Indonesia's Current Business Ecosystem for Creative Industries in Comic  
Source: Frederick et al. (2023)

In Indonesia, the current creative industry ecosystem in the comic sector had several weaknesses of its ecosystem scheme. According to Frederick et al. (2023), those weaknesses are: (1) the direction, policies and strategies of the creative business ecosystem in Indonesia do not have sustainability; (2) the absence of interdependence with each other causes no urgency to innovate continuously; (3) the ecosystem does not have a value proposition and a global scale development plan, which then will caused; (4) difficult entry wall, because the industry does not guarantee a stable revenue return; (5) and the ecosystem does not have collaboration points that allows have a significant impact on the entire ecosystem chain. These weaknesses were indicated because the stakeholders are not well-connected to each other. Therefore, it results in a repeating effort in each ecosystem stakeholder.

## 2.2 Participatory Design

According to Wacnik et al. (2025), participatory design refers to an approach to technology development that actively involves stakeholders, particularly end users who are most affected by the outcomes. Participatory design

requires humility, which means acknowledging the diffuse designers and creativity apart from the academic training. For that reason, all individuals learn participatory skills and has the potential to effectively participate in various ways in the making of all decisions that will affect them (Sanoff, 2022). Originally, participatory design did not form a concept of “stakeholders”, as it was focused on working with those who “use” a technology, mainly user-centred design. But now this approach had to broaden its scope of understanding of what might be meant by “democratising innovation” in a wider sense (Björgevinnsson et al., 2010).

In *Design, When Everybody Designs* (2015, p.37), Manzini stated that:

*“In contemporary society we can observe two design forms: expert design and diffuse design”*

He frames diffuse design as the domain of “everyone who, without being a designer, designs,” while expert design refers to “the community of trained professionals” (p. 39-40). This concept is what will be implemented in the participatory design. By implementing a diffuse design approach, the design-led process adapts to a particular characteristic, that the “designers” came from various and diverse social backgrounds and actors. It also adapts to the bottom-up social approach, where professional designers can also play an important role by operating in two main ways, those are: designing *with* and designing *for* communities (Manzini, 2014, p.62). Moreover, it requires a set of new design skills for the local communities and social actors, especially in promoting collaboration among various stakeholders, participating in the construction of shared visions and scenarios; and combining the existing product and service to support the creative community members (p.62).

Participatory design aims to design products and services that effectively respond to users’ needs while enabling them in achieving their intended outcome. Another characteristic of this approach is allowing designers and actors to change roles with the purpose of encouraging problem solving among stakeholders and empowering people to create solutions. In which, the decision and solution must be agreed together, because the process will involve a multidisciplinary, aiming for a society-level impact (involved with many people), rather than just a single person,

client, brand, or company, to achieve the level of problem-solving toward the discussed issue. In most cases, participatory design actors have shown a significant process and importance for collaboration and newer approaches in many fields, such as urban planning, agriculture, ecology, science and social politics, etc. Participatory design could be implemented through collaborative workshops and ideation, co-design and prototyping, contextual and observational methods, digital and remote participation, and decision-making and evaluation.

### **2.2.1 Co-Design Methods**

Based on the book *Design for Social Innovation* by Manzini (2015), co-designing is a process in which everybody is allowed to bring ideas, even though these ideas could, at times, generate problem and tension. Additionally, it is an integrative participatory decision-making process, by incorporating reflexivity and creativity while using diverse stakeholder perception and knowledge to determine challenges and issues, along with exploring solutions for navigating complex adaptive systems, that will enable transformation among the system (O'Donnell et al., 2025). In this case, co-design serves as one of the methods that are possible to conduct and generate joint ideas throughout the participatory process. This perspective on design subsequently repositions the designer to that of being an embedded designer in context and community who is co-facilitating group-based inquiry processes. It is important to emphasize the expertise in designing that the design brings as a guide that is relevant for systemic change projects (Berg et al., 2023).

The current co-design approach research and practice were most dominant in the field of healthcare and medicine; digital product design and UX technology; public sector, policy, and social innovation; urban planning, architectural, and public spaces; and education and curriculum design. It is most likely practiced in Australia, United Kingdom, Norway, Sweden, and Denmark. The framework and co-design process practice shows that these countries are able to provide an effective process and solution among the stakeholders in improving the immediate experience of users and reducing

system errors through co-design process (Mukoro, 2023). The co-design solutions, that are produced from various stakeholder in the field, have reached the system level transformation, where it affects how the stakeholder works and process, and eventually impacts the users and society.

Meanwhile co-design in Indonesia, began to gain familiarity in the field of urban planning and public space revitalization. According to the study case of co-design practices in Jakarta, Solo and Malang by Setiawan et al. (2018), co-design in Indonesian urban planning is largely driven by active Non-Governmental Organizations (NGOs) and international foundations partnering with local stakeholders to redesign dense urban spaces, and public parks. Initiatives such as “Kampung Kota Bersama” and Child-Friendly Space have implemented participatory design projects in cities and worked directly with the local residents to map and co-design multi-purpose common space, that made specially for the local community’s micro-economic and social activities.

The challenge in Indonesian co-design practice was often cause by the habit of top-down level, where the local government are historically accustomed to rigid, bureaucratic planning, and some public participation exercises are function purely as compliance checklists for budgeting requirement rather than genuine and interactive design collaboration that include the local residents and communities. These challenges show the difference in each cultural perceptions and mindset from the westerns and Indonesia, such as the western countries often encourage to speak up for their individual rights, adapt to flat hierarchy system with absolute equality among stakeholders, and rely heavily on rigid system, structured timeline, and specialized design toolkit for the systems. Meanwhile in Indonesia, the society were focused on social harmony between participants, stakeholders, or communities, adapts to authority system (refers to the cultural respect for elders, community leaders, and government official), and the system relies more on the spirit and value of “Gotong Royong” and “Musyawarah” that designed to happen in an informal, relational, and spontaneous conversations

between stakeholder. This difference, however, became one of the important factors in defining the effectiveness and success of the co-design approach practice in the ecosystem.

Nevertheless, the key elements of co-design are not only to gather information about the issue or users, but to gain insight from their different experiences, values, and ways to collaborate and visions to propose innovative ideas (Hyysalo & Dorta, 2025). Participatory co-design could be implemented through collaborative workshops and ideation, co-design and prototyping, contextual and observational methods, digital and remote participation, decision-making, and evaluation.

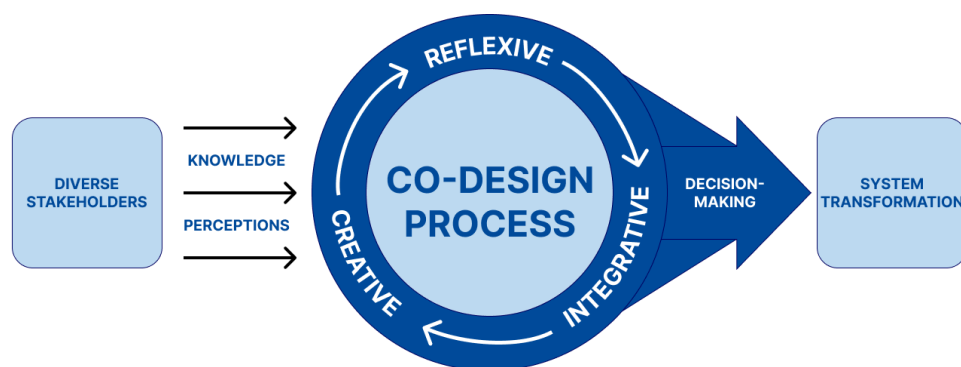


Figure 2.3 Co-Design Method Concept  
Source: O'Donnell et al. (2025)

During the process of co-design ideation, co-design allows the designer to channel their new ideas by conversing together using sketches, physical models or even words. These sketches and physical models will act as a form of mediating representation (Johnson et al., 2017), bringing vision to the proper perception among the designers, and supporting a clearer meaning towards the presented words. On the other hand, since the participants of co-design were not trained in the field of design, it often sparked struggles to grasp the proper scale. Therefore, templated-based components may be more accessible for the participant to use, if it were

facilitated and designed to represent a physical form of mediation (Dorta et al., 2019).

The co-design approach was adapted from two co-design models, those are the tools developed by the UK Design Council and Systemic Design Association Framework. The UK Design Council tools propose new approaches that encourage designers to collaborate with actors beyond the design discipline and support the transition toward alternative regenerative systems (Design Council, 2021). It functions as an initial trigger through questions, starting-point statements, and activities that enable participants to brainstorm with other stakeholders regarding the issues being discussed. The UK Design Council has six stages of process, as the following below.

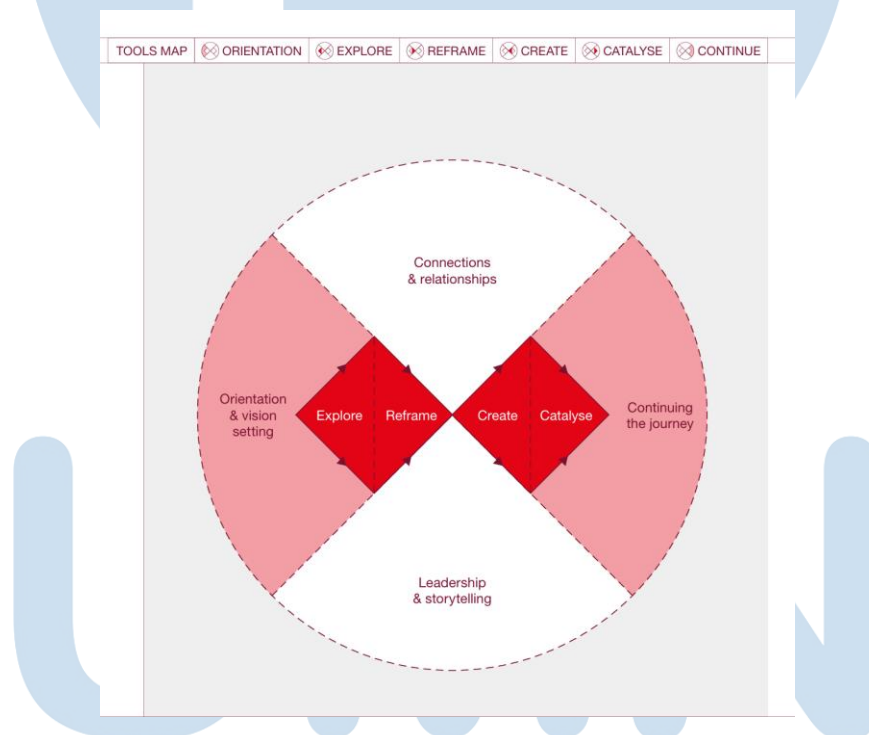


Figure 2.4 Systemic Design Framework by The UK Design Council  
Source: UK Design Council (2021)

### 1. Orientation

This stage aims to rethink and realign the direction, goals, expected outcome, and the timeline process. Orientation focused to start a new vision together among the participants, by using principles guide to help accomplish those goals. This stage was

conducted into four tools that are able to help co-designers define their vision, roles, and future goals, those are: Design for Planet Principles, Team Roles, Future Vision, and Stakeholder Ecosystem.

## 2. **Explore**

Before generating and developing new ideas, this stage is focused on expanding knowledge and deepening the understanding regarding the issue. This stage could be done through design research to gather various types of knowledge, through different perspectives from the professionals or experiences from each stakeholder. Through a better understanding from the current system, it is easier for the participant to think systematically about the cause of the problems. This stage consisted of one tool from the UK Design Council, that is Root Cause Analysis.

## 3. **Reframe**

This stage aims to explore an alternative perspective to a regenerated product, place, and service that show the new values and beliefs. To create that goal, this stage allows the participant to reframe and reorganize the challenges in different perspectives, to generate and develop new ideas. Reframe stages consist of two main tools to help achieve the goals in this stage, those are: Different Perspective, and Deep Reflection.

## 4. **Create**

After exploring and reframing the problems thoroughly, this stage focused on creating a series of actions and different ideas that are interconnected with other interventions. Through this stage, participants were allowed to generate ideas that are possible to happen at a different kind of system level, such as products, services, places, policies, regulations, standards, or cultural mindset, as well as considering the unintended

consequences of the generated ideas. To achieve the process of the stage, there are two tools that are able to help the participant fulfill this stage, the tools are: Portfolio of Ideas and Unintended Consequences.

#### 5. **Catalyse**

This stage helps the participant to show what the new vision and ideas are like in real life. Not only does it give a wider perspective, but it also creates a prototype and tests how the prototype works. This stage allowed participants to explore how these ideas connected to other interventions, to grow with the audiences' support and to gain feedback to create better solutions. This stage utilizes one main tool to achieve the goal of the stage. The tool is Radical New Narratives.

#### 6. **Continue**

In a dynamic system of the working process, it is important to reflect and learn from the previous experience and improvement. The final stage of UK Design Council Framework aims to reflect the future vision from the first stage, along with the process. This stage allows the participant to keep iterating and building the ecosystem with consideration from the type of value that the project aims and the interventions it causes to the system. This stage focused on using Regenerative Business Canvas as the tool to achieve these goals.

On the other hand, the Systemic Design Association Framework related to systemic design approaches are designed to integrate system thinking with design practices, aiming to address complex, multi-stakeholder challenges like climate change, social injustice, and urban planning. It help practitioners shift from designing isolated products to intervening in entire system (Systemic Design Association, 2026). Systemic Design Association Toolkit has seven stages of co-design toolkit. It is as follows below.

#### 1. **Framing the System**

This stage focused on setting the boundaries of the system in space and identifying the hypothetical parts and relationship. Similar to the UK Design Council toolkit, this stage aims to identify the goals, structures, process, actors, variables, and current system. This stage consists of several toolkits, those are: Iterative Inquiry, Actors Map, Rich Context, and Niche Discovery.

## 2. **Listening to the System**

This stage focused on listening to the experiences of people and discovering how the interactions lead to the system's behavior by verifying the initial hypotheses. This stage functions as a reflective phase of the process. It explores and discovers the role of each stakeholder and maps the research questions and systems. In this stage, there are four co-design toolkits that are able to help engage this stage, such as: Stakeholder Dimensions, Research Questions, Contextual Interview and Actants Map.

## 3. **Understanding the System**

This stage aims to see how the variables and interactions influence the dynamics and emergent behavior by identifying the leverage points to work with. This stage allows the participants to understand deeper how the system works from the surface level to the core level of the system thoroughly. This stage has consisted of four co-design toolkits, such as: Social Ecosystem, Multi Capitals Systems Map, Influence Map, and Story Loop Diagram.

## 4. **Defining the Desired Future**

This stage is focused on helping the stakeholders articulate the common desired future and the intended value creation. This stage allowed the participants to design and create the concept of the desired future for the system. This stage has two toolkits, those are: Value Propositions and Three Horizons.

## 5. Exploring the Possibility Space

This stage is focused on exploring the most effective design interventions with potential for the system. It functions to define variations for implementation in different contexts. To achieve the desired future that was previously designed, the participants are given freedom to explore many scenarios and strategies to reach the desired outcome. This stage provides four tools that are able to evoke the goals: Future State Scenarios, Intervention Strategy, Connector, and Contextual Variations.

## 6. Planning the Change Process

This stage aims to define and plan how the organization and eco-system should (re-)organize to deliver the intended value. This stage has four toolkits allowing the participants to design the strategy and process of the reorganization and eco-system, such as: Theory of Systems Change and Action, Process Enneagram, Change Readiness, and Ecosystem Governance.

## 7. Fostering the Transition

This stage aims to define how the interventions will mature, grow, and finally be adopted in the system. This stage can be implemented through four toolkits, such as: Stakeholder Mobilisation, Roadmap for Transition by Design, Collaboration Model, and Adaptive Cycle Strategy.

In conclusion, SDA provides a high-level view for tackling complex, structural challenges, while the UK Design Council's Double Diamond framework provides a structured, practical, and user-centric process to implement and iterate on those solutions. Both of the frameworks were integrated with one another and established a structured co-design methodology that guides participants from problem framing and system understanding to ideation process, intervention planning, prototyping, and long-term transition strategies.

### 2.2.2 World-Café Method

The World Cafe is a participatory design method that aims to gather information and generate insight through collective discussion among groups or communities, regarding issues and problems that are relevant to them (Clements et al., 2023). This method was created in 1995 by Juanita Brown and David Isaacs in California, where it was developed to mirror the valuable, free-flowing conversation that often happens during coffee breaks at conferences (World Cafe, 2026). Still based on Clements et al. research journal *The World Cafe methods for engaging groups in conversation* (2023), World Cafe methods' main emphasis was on facilitating conversation, which means that facilitators should not position themselves as the experts of the topic, to interfere with the conversation along with the other participants, or even to lead the attendees' contributions.

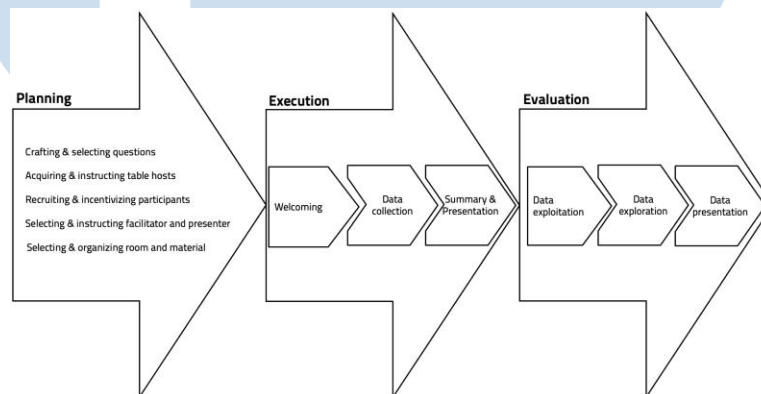


Figure 2.5 Three Phase of World Café Methods  
Source: Klatt et al. (2025)

According to a research article *How to Run a World Cafe: A Comprehensive Guide Using a Three-Phase Blueprint* by Klatt et al. (2025), the World Cafe methods were divided into three phases: planning, execution, and evaluation. The planning phase was aimed to formulate the right questions; brief the key players and roles, such as table host, participants, facilitator, and presenter; and design the room, including the tables, chair, collaterals, and presentation projected on the wall. Then, the execution phase will be focusing on the activities during the events, such as: (1) Welcoming, including introduction to the methods, welcoming participants, introduction

to the technical and guide for the activities; (2) Collecting Data, that was taken during the World Cafe discussion among the participants; (3) Summarizing and Presenting Result, the host will summarized the result of the discussion when the process are completed. Afterwards, the Evaluation phase will be taken once the World Cafe method is complete.

### **2.3 Transformative Ideas in Participatory Design**

In the context of design, innovation plays a crucial role, not only as the business and economic sector driver, but also primarily as a mindset that potentially effects in shaping the future in a sustainable and future-oriented system (Peschl, 2019). Based on the definition by Manzini (2015, p. 62), design for social innovation is everything that expert design can do to activate, sustain, and orient processes of social change toward sustainability. Innovation is not only about the integrated knowledge processes along the system, but it also about the transforming and shaping future condition of the environment. This is where the role of collaboration becomes a significant element. In the social aspect, collaboration between designers, innovators, users, and various stakeholders, were brought together to achieve diverse perspectives toward a problem or issue, which then provided new key ideas, insight, and concept of solution.

According to Trischler et al. (2019) in *Co-design: From Expert- to User-Driven Ideas in Public Service Design* journal article, design-lead approaches have increased interest in participation in creative innovation and creative problem-solving. There are many available methods that enable designers to explore this field. The primary element of design thinking is human-centered design, which is based on the assumption that design solutions gain significance only when they become part of people's lived experiences.

Predominantly, design thinking uses a team-based approach, where it involves multiple members with different backgrounds and expertises. By using multidisciplinary teams, the process evokes numerous different perspectives and ideas generated along the process. The team would be required to collaborate with each other on several design tasks. This would specifically build an interaction and initiative among the participants, and provide insight and expertise on the issue.

One of the user-centered design approaches that has effective examples for such collaborative processes was co-design methods (Peschl, 2019).

Design gets more impact as innovation and intervention contributes to positive change. Innovation in design can also be achieved and impacted into transformation and designers play an important role in shaping and distributing new values and models that encourage innovation and lead to transformation. According to Stephan in the book of *Designing Concerns-Bruno Latour und das Transformation Design* (in translated version, 2024) , transformation is a process needed in communities, companies, and society. These changes take values and orientations from the past, whereas transformation sets a cause in the future (Stephan, 2024). The challenge was that transformation processes need to coordinate through various group of stakeholders.

Therefore, co-design methods, that was previously defined as an integrative participatory decision-making process, by incorporating reflexivity and creativity while using diverse stakeholder perception and knowledge to determine challenges and issues, along with explore solutions for navigating complex adaptive systems, that will enable transformation among the system by O'Donnell (2025), was correlated closely with participatory design. This method is widely recognized by researchers, practitioners, and organizations as one of the key methods that are able to drive innovation, by adapting the tacit knowledge of end-users into the design process.

Additionally, co-design has developed in a team collaboration concept, that allows non-designer participants to become equal members of the design team (Trischler et al., 2019). Through the discussion process, stakeholder collaboration and co-design activity tools that were used in the co-design, participants were given the chance to explore and discover the possible insight and drive innovation through a system transformational process.

#### **2.4 System Intervention Depth**

According to Darzentas & Darzentas in *Systems Thinking in Design: Service Design and Self-Services* research journal (2014), a 'system' refers to a complex arrangement of interrelated elements whose interactions create synergistic

effects, resulting in an overall outcome that exceeds the sum of its parts. Systems exist all around us, including in our own bodies, which often are collections of its part and have complex relations with one element and another. In the field of design, system thinking is an approach where designers use to analyze problems in an appropriate context (Interaction Design Foundation, 2024). Appropriate context means the correct or relevant situation, environment, or condition in which the problem exists. This could be in the field of social communities, environment, economy, policy or regulations, and even relationships between components. System thinking requires shifts from traditional and classical decomposition approaches of doing things, where it offers perspectives and tools for understanding relationships between things in the system (Darzentas & Darzentas, 2014). System thinking mainly contains three kinds of things: elements, interconnections and a function or purpose. Therefore, system thinking could be concluded as a goal-oriented system.

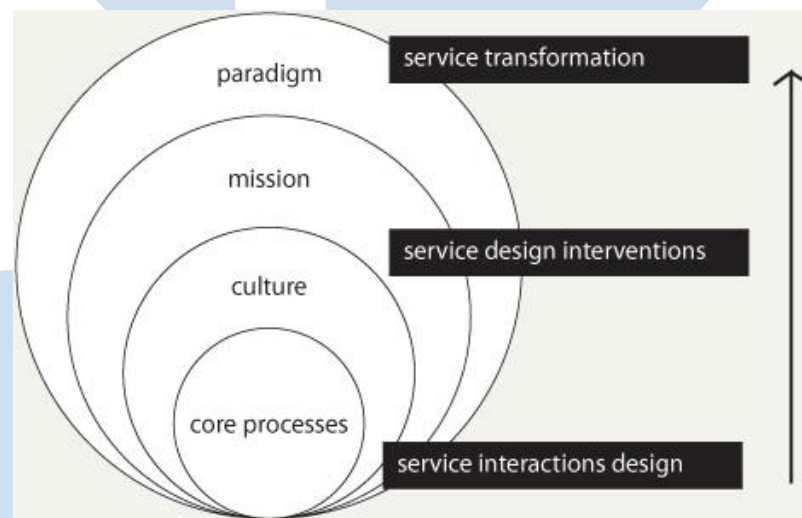


Figure 2.6 Level of Change within Service Design Practice  
Source: Sangiorgi (2011)

However, in improving and developing how a system works, a system requires intervention to broaden the range of evidence that is considered to be relevant, allowing a more comprehensive understanding of the system from a systemic perspective (Moore et al., 2018). Based on the definition of system intervention by Dunaway et al. (2011), system intervention is a way to coordinate

approaches that mix multiple strategies and aimed at changing community systems to address specific issues. It is necessary to introduce new conditions and solutions and redirect the system to prevent it from reaching an unsafe or unstable zone. Indirectly, an intervention could potentially transform a system behaviour with the precise solution.

In 1999, Donella Meadows introduced the concept of leverage point in system thinking, by identifying strategic points in a system where small interventions are able to lead significant changes (Loučková et al., 2024). The leverage points framework functions to help researchers understand the depth of how systems respond to change, distinguishing between shallow intervention that produces small and limited impact and deep interventions that are able to transform the system as whole.

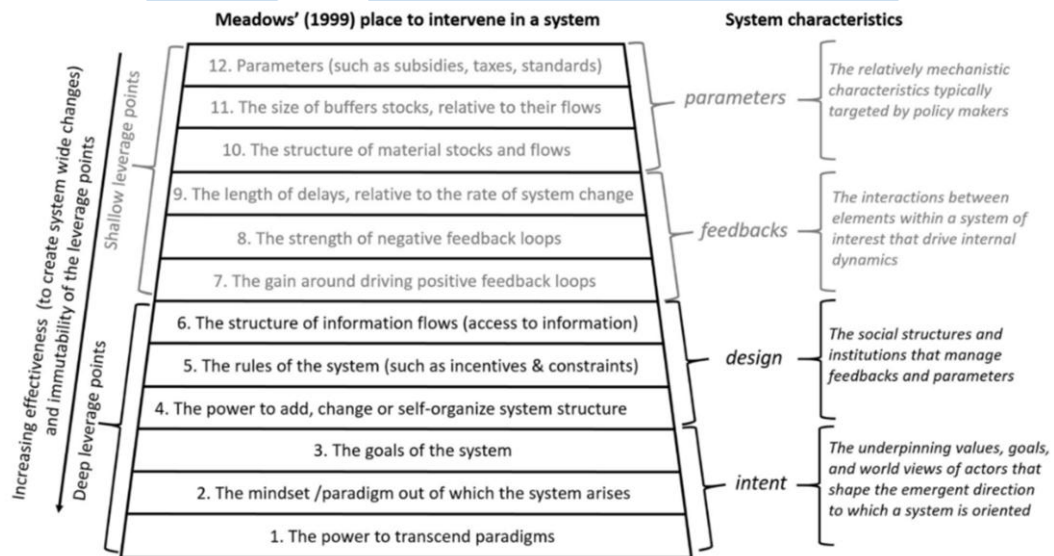


Figure 2.7 Leverage Points, System Intervention Depth Framework  
Source: Meadows (1999)

Meadows categorized the framework of leverage point consist of two main areas with twelve leverage points in total, as the following list:

1. **Shallow Interventions**, that often focus on individual behaviour in incentives, or mechanical system changes, with the level of:
  - a. 12 - Constants, parameters, numbers (such as subsidies, taxes, standards)

- b. 11 - The size of buffers and other stabilizing stocks, relative to their flows
  - c. 10 - The structure of material stocks and flows (such as transport networks, population ages structures)
  - d. 9 - The length of delays, relative to the system changes
  - e. 8 - The strength of negative feedback loops
  - f. 7 - The gain around driving positive feedback loops
2. **Deep Interventions**, that often address mental models, mindset, and the foundation structure of the system, with the level of:
- a. 6 - The structure of information flows (such as access to information)
  - b. 5 - The rules of the system (such as incentives and constraints)
  - c. 4 - The power to add, change or self-organize system structure
  - d. 3 - The goals of the system
  - e. 2 - The mindset / paradigm out of which the system arise
  - f. 1 - The power to transcend paradigms

Furthermore, according to the system characteristic, Meadows' leverage points were categorized into four groups, these includes:

1. **Intent (System Paradigm)**, where the underpinning values, goals and world view of actors that shape the emergent direction to which a system is oriented. This category includes level 1 – 3 of the leverage points, focused on the ability to shift and change the system and paradigms.
2. **Design (System Structure)**, where the social structures and institutions that manage feedbacks and parameters. This category includes level 4 – 6 of the leverage points, focused on creating a structure design as a start of system-level of transformation.
3. **Feedback (Feedback Loop)**, where the interactions between elements within a system of interest that drive internal dynamics. This category includes level 7 – 9, focused on getting interactions,

insight, opinion, and interest on changing the system, as a start of encouraging transformation in the system.

4. **Parameters**, where the relatively mechanistic characteristics typically targeted by policy makers. This category includes level 10 – 12, mainly focused on numbers, economy, and policy, as an act to change the system.

In this research, leverage point frameworks are particularly relevant to guide system interventions, as it highlights areas where design solutions, insight, and ideas are able to produce systemic change, rather than merely just addressing isolated symptoms and issues. By focusing on the leverage point framework, intervention level can target deeper system structures, relationships, and underlying assumptions that shape system behaviour. However, despite the growing interest in co-design for addressing complex challenges and issues in Indonesia Comic Ecosystem, the relationship between co-design insights and leverage points identification for systemic intervention remains insufficiently explored.

UMMN

UNIVERSITAS  
MULTIMEDIA  
NUSANTARA